UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/081,441	02/22/2002	Shih-Jong J. Lee	SV16	9997

29738   7590   08/28/2006

SHIH-JONG J. LEE
15418 SE 53RD PLACE
BELLEVUE, WA 98006

EXAMINER
HIRL, JOSEPH P

ART UNIT	PAPER NUMBER
2129	

DATE MAILED: 08/28/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE _3_ MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.
- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on _17 February 2005_.

2a)☒ This action is **FINAL**.   2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) _1-20,22 and 23_ is/are pending in the application.

    4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) _1-20,22 and 23_ is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☒ The drawing(s) filed on _Feb 2, 2002_ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

    Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

    Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

    a)☐ All b)☐ Some * c)☐ None of:

      1.☐ Certified copies of the priority documents have been received.

      2.☐ Certified copies of the priority documents have been received in Application No. _____.

      3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

    * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1)☐ Notice of References Cited (PTO-892)

2)☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)

3)☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date _____.

4)☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.

5)☐ Notice of Informal Patent Application (PTO-152)

6)☐ Other: _____.

DETAILED ACTION

1.   This Office Action is in response to an AMENDMENT entered February 17, 2005

for the patent application 10/081441 filed on February 22, 2002.

2.   The First Office Action of May 3, 2004 is fully incorporated into this Final Office

Action by reference.

Claim Rejections - 35 USC § 101

3.   35 U.S.C. 101 reads as follows:

> Whoever invents or discovers any new and useful process, machine, manufacture, or composition of
> matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the
> conditions and requirements of this title.

Claims 1-20, 22 and 23 are rejected under 35 U.S.C. § 101 for nonstatutory

subject matter. The computer system must set forth a practical application of § 101

judicial exception to produce a real-world result. Benson, 409 U.S. at 71-72, 175 USPQ

at 676-77. The invention is ineligible because it has not been limited to a substantial

practical application.

In determining whether the claim is for a "practical application," the focus is not

on whether the steps taken to achieve a particular result are useful, tangible, and

concrete, but rather that the final result achieved by the claimed invention is useful,

tangible and concrete. If the claim is directed to a practical application of the § 101

judicial exceptions producing a result tied to the physical world that does not preempt

the judicial exception, then the claim meets the statutory requirement of 35 U.S. C. §

101.

The invention must be for a practical application and either:

1).   specify transforming (physical thing – article) or

2).   have the Final Result (not the steps) achieve or produce a

useful (specific, substantial and credible),

concrete (substantially repeatable / non unpredictable), and

tangible (real world / non abstract) result

(tangibility is the opposite of abstractness).

A claim that is so broad that it reads on both statutory and non-statutory subject

matter, must be amended, and if the specification discloses a practical application but

the claim is broader than the disclosure such that it does not require the practical

application, then the claim must be amended.

Claims that, use training samples to determine decision characteristics,

determine an integrated confidence value for each class, prune the terminal nodes by

combining the two terminal nodes, and calculate an evaluation function selected from

the set consisting of integrated confidence value and reliability measures are not

statutory. Simply, the results are not practical applications.

Claim Rejections - 35 USC § 102

4.   The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that

form the basis for the rejections under this section made in this Office action:

> A person shall be entitled to a patent unless –
>
> (e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States. only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

5.   Claims 1-23 are rejected under 35 U.S.C. 102(e) as being anticipated by Guyon

et al (U.S. Pub. 2003/0172043, referred to as Guyon).

Claim 1

Guyon anticipates (a) Input a decision tree (**Guyon**, Figs. 1 and 9; p 0077;

Examiner's Note (EN): ¶ 11. applies; the tree is inherent in the problem formulation from

which Fig. 9 develops); (b) Input a set of training samples (**Guyon**, Figs. 1; EN: item

103); (c) Use the training samples to determine a decision characteristic for at least one

decision tree node, said decision characteristic selected from the group consisting of

global characteristics and population characteristics (**Guyon**, Fig. 9; EN: the global and

population characteristics are axiomatic to the input data structure).

Claim 2

Guyon anticipates population characteristics provides a prevalence independent

characterization of the at least one decision tree node that compensates for unequal

class prevalence in the training samples (**Guyon**, p 0079; Fig. 9; EN: data expansion

compensates for class dominance).

Claim 3

Guyon anticipates global characteristics and population characteristics

discriminates between noise and consistent application characteristics (**Guyon**, p 0031:

EN: outliers are global and can be considered noise).

Claim 4

Guyon anticipates the global characteristics include global counts (**Guyon**, p

0185; EN: predictive statistics would include global counts).

Claim 5

Guyon anticipates the global characteristics include global population statistic

(**Guyon**, p 0185).

Claim 6

Guyon anticipates population characteristics include local population statistic

(**Guyon**, p 0193; EN: local population statistics relate to for every gene selected, there

are only two alternatives).

Claim 7

Guyon anticipates (a) Input a decision tree (**Guyon**, Figs. 1 and 9; p 0077;

Examiner's Note (EN): para 2 above applies; the tree is inherent in the problem

formulation from which Fig. 9 develops); (b) Input a plurality of decision characteristics

selected from the group consisting of global characteristics and population

characteristics from at least one terminal node of the decision tree (**Guyon**, p 0194: EN:

such characteristics will be along the path to the leaf node); (c) Determine the

confidence value for each of the plurality of said decision characteristics (**Guyon**, p

0207); (d) Determine an integrated confidence value for each class of said at least one

terminal node (**Guyon**, p 0207).

Claim 8

Guyon anticipates assigning the class with the maximum integrated confidence

value as the decision for the terminal node (**Guyon**, p 0088).

Claim 9

Guyon anticipates the integrated confidence value as the likelihood value

(**Guyon**, p 0067) .

Claim 10

Guyon anticipates the global characteristics and population characteristics are

selected from the group consisting of global counts, local counts, global population

statistic, and local population statistic (**Guyon**, Figs. 1; EN: synonymous to input data).

Claim 11

Guyon anticipates the confidence value is selected from the set consisting of

local count confidence, local population confidence, global count confidence and global

population confidence (**Guyon**, p 0207).

Claim 12

Guyon anticipates the integrated confidence value is a weighted combination of a

plurality of confidence values (**Guyon**, p 0364).

Claim 13

Guyon anticipates the global characteristics have a global context coverage that is adjusted using different layer depths (**Guyon**, p 0364; EN: global context coverage is simply what applies and what does not apply).

Claim 14

Guyon anticipates the global characteristics have a global context coverage that is adjusted on a minimum number of training samples (**Guyon**, p 0082; EN: it is axiomatic that coverage of the model is only as good as the training data base).

Claim 15

Guyon anticipates (a) Input a decision tree (**Guyon**, Figs. 1 and 9; p 0077; Examiner's Note (EN): para 2 above applies; the tree is inherent in the problem formulation from which Fig. 9 develops); (b) Input a set of training samples (**Guyon**, Figs. 1; EN: item 103); (c) Generate a regulated measure selected from the group consisting of integrated confidence values and reliability measures (**Guyon**, p 0207) ; (d) For a non-terminal node of the tree having two descending terminal nodes, determine the accuracy values using the regulated measure under two separate nodes or combined node conditions (**Guyon**, p 0191); (e) If combined node accuracy value is greater than the two separate node accuracy value, prune the terminal nodes by combing the two terminal nodes and convert the associated non-terminal nodes into one terminal node (**Guyon**, p 0128).

Claim 16

Guyon anticipates wherein the reliability measures include a local population

reliability measure (**Guyon**, p 0207; EN: confidence and reliability are synonymous; all

(local) examples of the training data were tested).

Claim 17

Guyon anticipates reliability measures include a count reliability measure

(**Guyon**, p 0207; EN: confidence and reliability are synonymous; all examples of the

training data were tested).

Claim 18

Guyon anticipates the reliability measures include a population reliability

measure (**Guyon**, p 0207; EN: confidence and reliability are synonymous; all examples

of the training data were tested).

Claim 19

Guyon anticipates the reliability measures include a combined reliability measure

(**Guyon**, p 0207; EN: confidence and reliability are synonymous; the leave–one-out is a

combined reliability metric).

Claim 20

Guyon anticipates the reliability measures include a global population reliability

measure (**Guyon**, p 0207; EN: confidence and reliability are synonymous; the leave–

one-out is a global reliability metric).

Claim 21

Guyon anticipates the reliability measures include a combined reliability measure

(**Guyon**, p 0207; EN: confidence and reliability are synonymous; the leave–one-out is a

combined reliability metric since it effects multiple levels of processing).

Claim 22

Guyon anticipates the reliability measure for the maximum class is integrated

with the classification accuracy as the criteria for tree pruning (**Guyon**, ps 0207; 0128;

EN: follows from better classification performance).

Claim 23

Guyon anticipates (a) Input a set of training samples (**Guyon**, Figs. 1; EN: item

103); (b) For at least one node, generate a set of candidate thresholds (**Guyon**, p

0082); (c) Partition data at a candidate threshold (**Guyon**, p 0082); (d) Calculate an

evaluation function selected from the set consisting of integrated confidence value and

reliability measures (**Guyon**, p 0082; 0207; EN: confidence and reliability values are

synonymous with range categorization; "and" should be "or"); (e) Select the partition for

the node as the one that maximizes the evaluation function (**Guyon**, p 0082; EN: one is

finished ...select the partition... when the training output is within a predetermined error

threshold).

Response to Arguments

6.   The General reply to claim rejections 35 USC § 112 are acknowledged.

7.   The rejection of claims 1-23 under 35 USC § 112, first paragraph is withdrawn.

8.   The rejection of claims 1-23 under 35 USC §101 remain. Applicant should

review the ¶ 3. above. Applicant is also encouraged to review the Interim Guidelines for

Examination of Patent Applications for Patent Subject Matter Eligibility published on

November 22, 2005 in the Official Gazette. Applicant is reminded that the claims and

only the claims form the metes and bounds of the invention and limitations appearing in

the specification but not recited in the claim are not read into the claim.

7.   Applicant's arguments filed on February 17, 2005 related rejection of claims 1-23

under 35 USC 102(e) have been fully considered but are not persuasive.

In reference to Applicant's argument:

Claim 1

Guyon does not discuss global or population characteristics as described in Section II.1.1 through Section
11.1.4. The Guyon figure 9 samples are not characterized for global or population characteristics.

Examiner's response:

¶ 11. applies. The claims and only the claims form the metes and bounds of the

invention. Limitations appearing in the specification but not recited in the claim are not

read into the claim. Rejection of claim 1 applies

In reference to Applicant's argument:

Claim 2

Although Guyon disclosed a preprocessing stage to "expanding data", upon a closer reading it becomes clear that the "expanding data" merely alters the dimensionality of the input data. It has nothing to do with the class prevalence. Furthermore, Guyon's preprocessing attempted to alter the data before the decision system is constructed. This teaches away from the decision regulation approach of the current invention that characterizes decision system after its construction and compensates for unequal class prevalence through population characteristics of a constructed decision tree and does not require preprocessing.

The prevalence independent characterization of tree node of the present invention that compensates for unequal class prevalence in the training samples is patentably distinct from the Guyon "expanding data".

Examiner's response:

¶ 11 applies. Prevalence is not defined in the specification. Prevalence is interpreted to be a quality or state. The limitations cited by the applicant are not identified in the claim ... "its construction and compensates for unequal class prevalence through population characteristics of a constructed decision tree and does not require preprocessing." "Prevalence independent characterization of tree node" is interpreted to be equivalent to the expanded data point that provides a varied representation of the input data ... Rejection of claim 2 remains.

In reference to Applicant's argument:

Claim 3

Although Guyon disclosed a SVM method that could reach zero leave-one-out error with at least as few as two genes. This has nothing to do with the discrimination between noise and consistent application characteristics.

Examiner's response:

¶ 11 applies. Noise and error are synonymous. Selecting the correct answer is equivalent to discriminating against noise. Rejection of claim 3 applies.

In reference to Applicant's argument:

Claim 4

Although Guyon cites a global combined graph, upon a closer reading it becomes clear that it is for the combined information such as multiple alternative candidate subsets of selected features with scores attached to them. The global counts of the current invention is clearly not related to the global combined graph of Guyon. The global counts of the current invention is clearly defined in the section 11.1.3 of the specification (paragraph 0091-0095).

Examiner's response:

¶ 11 applies. The claims and only the claims form the metes and bounds of the

invention. Limitations appearing in the specification but not recited in the claim are not

read into the claim. Rejection of claim 4 applies.

In reference to Applicant's argument:

Claim 5

Guyon cites a global combined graph that it is for the combined information such as multiple alternative candidate subsets of selected features with scores attached to them. The global population statistic of the current invention is clearly not related to the global combined graph of Guyon. The global population statistic of the current invention is clearly defined in the section 11.1.4 of the specification (paragraph 0096-0099).

Examiner's response:

¶ 11 applies. The claims and only the claims form the metes and bounds of the

invention. Limitations appearing in the specification but not recited in the claim are not

read into the claim. First Office Action rejection of claim 5 applies.

In reference to Applicant's argument:

Guyon describes a binary decision tree of depth 4. It consists of eight terminal nodes. Therefore, there are only two alternative gene selections and the selection is limited to four genes. The local population statistic of the current invention is the weighted training sample proportion for a class at a node. The local population statistic of the current invention is clearly defined in the section 11.1.2 of the specification (paragraph 00860090). It is clearly not related to the gene selection of Guyon as disclosed in Guyon, p 0193. Applicant respectfully submits that the Examiner interprets the claim language in light of the supporting disclosure per our General Reply to Claim Rejections - 35 USC §112.

Examiner's response:

¶ 11 applies. The claims and only the claims form the metes and bounds of the

invention. Limitations appearing in the specification but not recited in the claim are not

read into the claim. First Office Action rejection 6 applies.

In reference to Applicant's argument:

Claim 7

Examiner Hirl cited Guynn p 0194 and stated that the global characteristics and population characteristics
will be along the path to the leaf node. The global characteristics and population characteristics are
clearly defined in the specification section 11.1, paragraphs 0082-0099. They are not as simple as the
characteristics along the path of the leaf node. Examiner Hirl cited Guyon p 0207 anticipated confidence
value and integrated confidence value. Guyon did disclose a classification confidence. However, upon
close examination, it is clear that Guyon's classification confidence is a measure of fraction of errors
computed both on the independent test set and using the leave-one-out method on the training set. They
are distinctively different from the confidence values derived from each type of the characteristics and the
integrated confidence value as described in Section 11.2, specification paragraphs 0100 - 0108.

Examiner's response:

¶ 11 applies. The claims and only the claims form the metes and bounds of the

invention. Limitations appearing in the specification but not recited in the claim are not

read into the claim. First Office Action rejection of claim 7 applies.

In reference to Applicant's argument:

Guyon describes the determination of whether an optimal solution has been ascertained. This may be
performed manually or through an automated comparison process. Guyon disclosed neither integrated
confidence value nor the use of the value for class assignment in the terminal node whose antecedent
basis is disclosed in paragraph 0109 of the current specification and is clearly distinctive from Guyon.

Examiner's response:

¶ 11 applies. The claims and only the claims form the metes and bounds of the

invention. Limitations appearing in the specification but not recited in the claim are not

read into the claim. First Office Action rejection of claim 8 applies.

In reference to Applicant's argument:

Guyon's likelihood value is a loose association between measurements and effects, and is distinct from the assignment of likelihood based upon an integrated confidence measure whose antecedent basis clearly distinguishes from Guyon on specification paragraph 0110-0111.

Examiner's response:

¶ 11 applies. The claims and only the claims form the metes and bounds of the

invention. Limitations appearing in the specification but not recited in the claim are not

read into the claim. First Office Action rejection of claim 9 applies.

In reference to Applicant's argument:

Global characteristics and population characteristics selected from the group consisting of global counts, local counts, global population statistic, and local population statistic are specific measures of training data characteristics, whose antecedent basis is described in section II.1 of the specification. These measures are distinct from the processes and the inputs described in Guyon Figure 1.

Examiner's response:

¶ 11 applies. The claims and only the claims form the metes and bounds of the

invention. Limitations appearing in the specification but not recited in the claim are not

read into the claim. First Office Action rejection of claim 10 applies.

In reference to Applicant's argument:

Based on the same arguments as that for claim 7, Guyon,, p 0207, is not related to the confidence values of the current invention. The antecedent basis for local count confidence, local population confidence, global count confidence and global population confidence are given in the specification section 11.1. These measures are patentably distinct from the metrics of classifier quality and classification confidence measures described in Guyon (p0207).

Examiner's response:

¶ 11 applies. The claims and only the claims form the metes and bounds of the

invention. Limitations appearing in the specification but not recited in the claim are not

read into the claim. First Office Action rejection of claim 11 applies.

In reference to Applicant's argument:

The antecedent basis for the integrated confidence value given in paragraphs 0106-0108 of the specification is patentably distinct from the metrics of Golub's classifier described by Guyon which relates to well known linear discriminant functions. The integrated confidence value is a weighted combination of patentably distinct confidence values which are not described in Guyon (p0364).

Examiner's response:

¶ 11 applies. The claims and only the claims form the metes and bounds of the invention. Limitations appearing in the specification but not recited in the claim are not read into the claim. First Office Action rejection of claim 12 applies.

In reference to Applicant's argument:

The antecedent basis for the global context coverage that is adjusted using different layer depths given in paragraph 0094 of the specification is patentably distinct from the weight of Golub's classifier described by Guyon which relates to well known linear discriminant functions (Guyon, p0364).

Examiner's response:

¶ 11 applies. The claims and only the claims form the metes and bounds of the invention. Limitations appearing in the specification but not recited in the claim are not read into the claim. First Office Action rejection of claim 13 applies.

In reference to Applicant's argument:

The antecedent basis for the global context coverage that: is adjusted on a minimum number of training samples given in paragraph 0095 of the specification is patentably distinct from the determination of whether the training output is desirable using error threshold as described in Guyon, p 0082.

Examiner's response:

¶ 11 applies. The claims and only the claims form the metes and bounds of the invention. Limitations appearing in the specification but not recited in the claim are not read into the claim. First Office Action rejection of claim 14 applies.

In reference to Applicant's argument:

Based on the same arguments as those for claims 7 and 11, Guyon, p 0207, is not related to the integrated confidence values and reliability measures the current invention. The antecedent basis for integrated confidence values and reliability measures are given in the specification paragraphs 0106-0108 and paragraphs 0128-0133. These regulated measures are patentably distinct from the metrics of classifier quality and classification confidence measures described in Guyon (p0207).

Examiner's response:

¶ 11 applies. The claims and only the claims form the metes and bounds of the invention. Limitations appearing in the specification but not recited in the claim are not read into the claim. First Office Action rejection of claim 15 applies.

In reference to Applicant's argument:

Based on the same arguments as those for claims 7, 11 and 15, Guyon, p 0207, is not related to the reliability measures of the current invention. The antecedent basis for the reliability measures are given in the specification paragraphs 0128-0133. These reliability measures are patentably distinct from the metrics of classifier quality and classification confidence measures described in Guyon (1)0207).

Examiner's response:

¶ 11 applies. The claims and only the claims form the metes and bounds of the invention. Limitations appearing in the specification but not recited in the claim are not read into the claim. First Office Action rejection of claims 16-18 applies.

In reference to Applicant's argument:

Based on the same arguments as those for claims 7, 11, 15, 16, 17 and 18, Guyon, p 0207, is not related to the reliability measures of the current invention. The antecedent basis for the combined reliability measure is given in the specification paragraphs 01320135. This combined reliability measure is patentably distinct from the metrics of classifier quality and classification confidence measures including the fraction of errors computed using the leave-one-out method as described in Guyon (1)0207).

Examiner's response:

¶ 11 applies. The claims and only the claims form the metes and bounds of the

invention. Limitations appearing in the specification but not recited in the claim are not

read into the claim. First Office Action rejection of claim 19 applies.

In reference to Applicant's argument:

Based on the same arguments as those for claims 7, 11, 1.5, 16, 17, 18 and 19, Guyon, p 0207, is not
related to the reliability measures of the current invention. The antecedent basis for the global population
reliability measure is given in the specification paragraph 0131. This global population reliability measure
is patentably distinct from the metrics of classifier quality and classification confidence measures including
the fraction of errors computed using the leave-one-out method as described in Guyon (p0207).

Examiner's response:

¶ 11 applies. The claims and only the claims form the metes and bounds of the

invention. Limitations appearing in the specification but not recited in the claim are not

read into the claim. First Office Action rejection of claim 20 applies.

In reference to Applicant's argument:

Based on the same arguments as those for claims 7, 11, 15, 16, 17, 18, 19 and 20, Guyon, p 0207, is not
related to the reliability measures of the current invention. Based on the same arguments as those for
claim 15, Guyon, 0128, is for the pruning of the original input features and is not related to the pruning of
the terminal nodes.

Examiner's response:

¶ 11 applies. The claims and only the claims form the metes and bounds of the

invention. Limitations appearing in the specification but not recited in the claim are not

read into the claim. First Office Action rejection of claim 22 applies.

In reference to Applicant's argument:

Based on the same arguments as those for claims 14 (for Guyon, p 0082) and claims 7, 11, 15, 16, 17,
18, 19, 20, and 22 (for Guyon, p 0207), Guyon's method is not related to the integrated confidence values
and reliability measures based node partition of the current invention.

Examiner's response:

¶ 11 applies. The claims and only the claims form the metes and bounds of the

invention. Limitations appearing in the specification but not recited in the claim are not

read into the claim. First Office Action rejection of claim 23 applies.

In reference to Applicant's argument:

The antecedent basis for the integrated confidence values and reliability measures based node partition
given in section 11.4, paragraphs 0139-0142, of the specification is patentably distinct from the
determination of whether the training output is desirable using error threshold as described in Guyon, p
0082 and the metrics of classifier quality and classification confidence measures described in Guyon, p
0207.

Examiner's response:

¶ 11 applies. The claims and only the claims form the metes and bounds of the

invention. Limitations appearing in the specification but not recited in the claim are not

read into the claim. First Office Action rejection of related claims applies.

Examination Considerations

8.   The claims and only the claims form the metes and bounds of the invention.

"Office personnel are to give the claims their broadest reasonable interpretation in light

of the supporting disclosure. *In re Morris*, 127 F.3d 1048, 1054-55, 44USPQ2d 1023,

1027-28 (Fed. Cir. 1997). Limitations appearing in the specification but not recited in

the claim are not read into the claim. *In re Prater*, 415 F.2d, 1393, 1404-05, 162 USPQ

541, 550-551 (CCPA 1969)" (MPEP p 2100-8, c 2, l 45-48; p 2100-9, c 1, l 1-4). The

Examiner has full latitude to interpret each claim in the broadest reasonable sense. Examiner will reference prior art using terminology familiar to one of ordinary skill in the art. Such an approach is broad in concept and can be either explicit or implicit in meaning.

9.   Examiner's Notes are provided with the cited references to prior art to assist the applicant to better understand the nature of the prior art, application of such prior art and, as appropriate, to further indicate other prior art that maybe applied in other office actions. Such comments are entirely consistent with the intent and spirit of compact prosecution. However, and unless otherwise stated, the Examiner's Notes are not prior art but a link to prior art that one of ordinary skill in the art would find inherently appropriate.

10.   Unless otherwise annotated, Examiner's statements are to be interpreted in reference to that of one of ordinary skill in the art. Statements made in reference to the condition of the disclosure constitute, on the face of it, the basis and such would be obvious to one of ordinary skill in the art, establishing thereby an inherent prima facie statement.

11.   Examiner's Opinion: ¶¶ 8-10 apply. The Examiner has full latitude to interpret each claim in the broadest reasonable sense. To potentially overcome the above rejections to the subject claims related to 35 USC 102(e), and given that the applicant desires to incorporate the specification as an integral part of the claims, 35 USC §112, sixth paragraph must be followed **_explicitly_**. Applicant's above arguments including claims need an appropriate rewrite to be consistent with 35 USC §112, sixth paragraph.

The required terminology of *__"means for"__* or *__"step for"__* must be used to cover the

"corresponding structure, material, or acts described in the specification and equivalents

thereof." Argumentation in support of what the claims are intended to limit is

insufficient. Concerning the preamble of a claim, such preamble is not normally

considered in the claim limitations unless the body of the claim breathes life into the

claim. Applicant *__has not__* followed the format of a Jepson type claim (37 CFR §1.75(e)).

Conclusion

12.   Applicant's amendment necessitated the new ground(s) of rejection presented in

this Office action. Accordingly, **THIS ACTION IS MADE FINAL.** See MPEP

§ 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37

CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE

MONTHS from the mailing date of this action. In the event a first reply is filed within

TWO MONTHS of the mailing date of this final action and the advisory action is not

mailed until after the end of the THREE-MONTH shortened statutory period, then the

shortened statutory period will expire on the date the advisory action is mailed, and any

extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of

the advisory action. In no event, however, will the statutory period for reply expire later

than SIX MONTHS from the date of this final action.

13.   Claims 1-20, 22 and 23 are rejected.

Correspondence Information

14.   Any inquiry concerning this information or related to the subject disclosure

should be directed to the Primary Examiner, Joseph P. Hirl, whose telephone number is

(571) 272-3685. The Examiner can be reached on Monday – Thursday from

6:00 a.m. to 4:30 p.m.

If attempts to reach the Examiner by telephone are unsuccessful, the

Examiner's supervisor, David R. Vincent can be reached at (571) 272-3080.

Any response to this office action should be mailed to:

Commissioner of Patents and Trademarks,

Washington, D. C. 20231;

Hand delivered to:

Receptionist,

Customer Service Window,

Randolph Building,

401 Dulany Street,
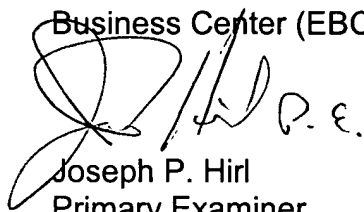
Alexandria, Virginia 22313,

(located on the first floor of the south side of the Randolph Building);

or faxed to:

(571) 273-8300 (for formal communications intended for entry.

Information regarding the status of an application may be obtained from the

Patent Application Information Retrieval (PAIR) system. Status information for

published applications may be obtained from either Private PAIR or Public PAIR.

Status information for unpublished applications is available through Private PAIR only.

For more information about the PAIR system, see http://pair-direct.uspto.gov. Should

you have any questions on access to Private PAIR system, contact the Electronic

Business Center (EBC) at 866-217-9197 (toll free).

Joseph P. Hirl
Primary Examiner
August 21, 2006